

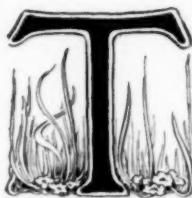
THE SCHOOL ARTS BOOK

Vol. III

APRIL, 1904

No. 8

COLOR TEACHING IN THE PUBLIC SCHOOLS



EACHERS are frequently surprised at conclusions formed by children who have mingled instruction with some previous notion. This should assure us that in teaching any subject it is as necessary to understand what is in the mind of the pupil as well as what one wishes to teach him; we should lead him from what he is to what he may be. For this reason the first few lessons in any subject should be adapted to reduce the knowledge of the class to a least common denominator from which one can progress with some degree of security that in the mind of each pupil the subject is being developed with logical continuity.

The method of leading a child from what he knows to what he does not know should be one which develops his self-reliance. The teacher who expounds a subject without giving his pupils experimental work will find the result of his teaching ephemeral; this is especially true of young children. The more we can show a child how to discover things for himself the more vital is our instruction; he no longer depends entirely upon the memory of

words but carries within himself the power of self-reliant reason, which is the only true education. The less a teacher says and the more a pupil does the more valuable the results.

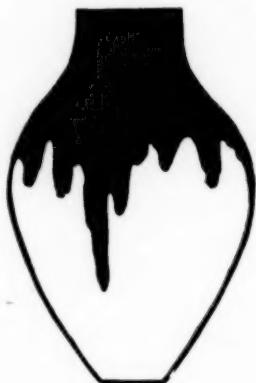
Knowledge of color is of two kinds, discrimination, or the recognition and classification of colors, and combination, or the mixing of pigments and arrangement of color in pictures and designs.

The power of discrimination of color may be developed independently of the power of combination of color and it is sometimes considered as the logical precedent in color instruction; psychology, however, has taught us that to take a hold upon the mind, activities must have a purpose and that the more closely results follow effort, the more intense the application and the deeper the mental impression; with this fact in view one can readily see that discrimination should always be accompanied by application and never be made an end in itself.

Most children when they enter school know the names of the hues red, green, blue and yellow but have very vague notions, if any, of violet and orange. They know the tints of red as "pink" and all broken colors by the general name of "brown." They must be led to classify colors in scales and to make simple application in pictures, designs or crafts.

The new thought of each lesson should be directly connected with the thought of the previous

lesson. Taking for a basis the child's knowledge of the color names red, yellow and blue, give him the corresponding pigments, a brush, paper and a little pan of water. Let him, with his brush, place drops of water on his paper, each drop as big round as a penny (see colored plate), into these drops let him touch two of his three colors, leaving the m



YELLOW	GREEN	BLUE
LIGHT GREEN	GREEN	DARK GREEN
BRIGHT GREEN	DULL GREEN	GREENISH GREY

to float and blend without interference, let him watch the action of the colors and tell what happens. It will not be long before some little fellow will say, "When I put blue and yellow together it always makes green." The other two secondaries will not be expressed so readily, owing to the fact that the color names are not known, while the difference in color will be noted quite as easily as the green, the

child will designate them as "a kind of red" and "a kind of blue." It naturally follows that in the next lesson these colors should be named and recognized. The children should see a great variety of hues, so far as possible avoiding variation in brilliancy and value. The colored objects may be anything obtainable but preferably colored papers, sample cover papers (any wholesale paper dealer can furnish these in great variety) or beads. The children may afterward, in another lesson, make a scale showing changes of hue (two primaries and a secondary color; see Fig. 1). For exercises let them use different mediums, at one lesson making a scale of yellow, green and blue by cutting out and pasting slips of paper of the desired hue upon a white background, at another lesson, using colored pencils or paints, making a scale of yellow, orange and red.

Application should be made at this point in picture work or design. An apple may be shown to the class. The children may be led to see that the colors, red and yellow, are not evenly distributed and that one hue blends with another. Having seen this they will be prepared to make on their paper, with clear water, a wet spot the size and shape of the appearance of the apple and to touch in the color as in the first exercise. Train the children to let the colors blend of themselves, as mixing too much with the brush will make a muddy or dingy color. When the colors are quite dry a green stem may be added.

In a similar way have the children make a flower with blue petals, yellow center and green stem and leaf. Thus we shall have applied two of our scales.

Now observing these paintings the class will see that colors may be bright or dull, light or dark. Having made observation the children may make scales as before using only three notes and apply

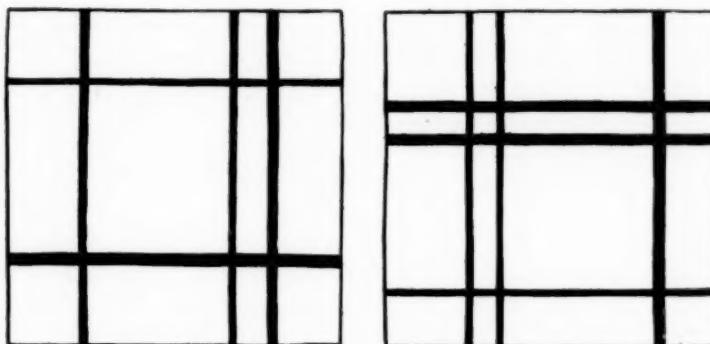


Fig. II. Plaids. One color used on cover papers of a more delicate tint.

these scales in a vase with "drip" glaze, Fig. 1, in plaids, Fig. 2, or by placing decorative figures of any bright color upon a background of a dull tone of the same color; the background must also contrast slightly in value as it is not possible to have a harmonious combination otherwise. In crafts the children may string beads, making a doll's necklace, for which three values of one color are chosen,

Figs. 3 and 4, and the child allowed to use his own taste in spacing, or the child may decorate a tiny pin cushion, covered with a dull tone, by sticking in pins with brilliant heads made of colored glass.

From this point ramification becomes infinite. We have taught the recognition of primary and secondary colors and the ways in which they may vary; discrimination can now be developed only in degree



III



IV

and our teaching can contain new truths only in combination.

We may now teach the first principle of color composition which is "dominance" or the existence of a chief color in all good pictures and designs. Point out all available instances of the principle of dominance in the home, the school, in games and so forth, showing that there is always a person, object or incident of chief importance. Experiment to see in how many ways a single color may become supreme. It will be found that quantity will sometimes make a color most prominent and sometimes

brilliancy, occasionally other contrasts, but we will be safe to confine ourselves to the first two conditions. The bowl in the colored plate shows the simplest way to produce dominance of tone, namely by using two notes from the same scale. A second way is to use analogous hues—colors adjacent in the spectrum such as green and yellow. Make the green dominant in quantity in some conventional decoration of vase or tile, then make the yellow dominant in quantity in a picture of a spray of yellow blossoms such as primrose or tansy. Try similar problems using green and blue. For example see the border in the colored plate. Then teach the terms "warm" and "cold" color.

Red and green, the most difficult of all colors to combine harmoniously, may be made harmonious by making both warm; that is red should be an orange red and green a yellow green, or by graying both, but even then, either the red or the green must be very much subordinated in quantity when they are used together.

It is not wise to permit children to make crude combinations of strongly contrasting hues. So far as possible, they should see only the best and most harmonious coloring. Teachers may avoid the production of the most atrocious results of the "first efforts" by having colored pencils used instead of paint and seeing that the pencil hues are "saturated" with a common hue. Using cover papers

for tinted backgrounds in place of attempting flat washes will be found to result in neater work than the use of water colors by the youngest children.

By "saturated" is meant a color so filled with another color as to almost lose its identity. If the children are given colored pencils which are green saturated with yellow, and red saturated with yellow, yellow becomes what is called the "key color" and the resulting combination is sure to be more satisfactory than if the standard green and red were used with the yellow.

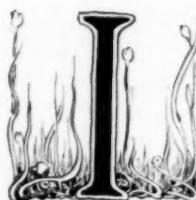
On account of the enthusiasm of children for the use of color there is danger of letting them advance too rapidly or, rather, not advance at all, for the indiscriminate use of color leads to the fixing of numberless errors in the mind of the child. It is better to hasten slowly and never for the sake of novelty to use elaborate combinations of color. In the primary school children should never attempt to combine more than two colors, nor to use more than three values or three brilliancies, but practice within these limits permits an endless variety of exercises.

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A LESSON IN ARTISTIC MANUAL TRAINING

A TOY HAMMOCK



N THE new Manual Training which tries to develop the inventive, artistic and manual skill of the pupil it is difficult to find problems which combine these elements and, at the same time, can be introduced naturally and not laboriously or artificially into the child's school life. The Toy Hammock which I have been asked to describe for the School Arts Book, has been successfully worked out by the children of the third and fourth grades, ranging in age from seven to nine years. It combines to an unusual degree the requirements of a course in which manual training and drawing are under one supervision and treated as one course, not separate courses, of study. This problem of the Toy Hammock has been done by many of the children in three weeks, by others in a week or more longer. While many children have made more than one at home, one little girl has done five of various sizes and designs.

The designs for the hammocks were made first as an exercise in drawing and color. The stripes were designed in ink, on gray paper, free brush line for variety of spacing, no two alike, but each the

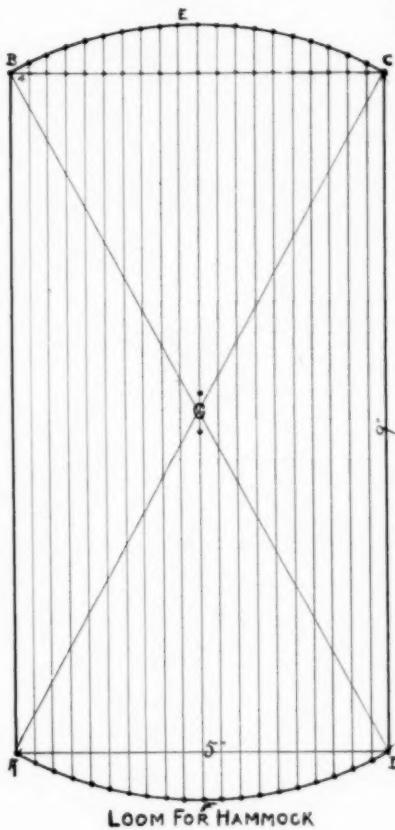
product of the child's idea of good proportion. Then the black and gray stripes were translated into color, in dark and light tones in hues. The patterns thus made were followed out later in the weaving. The loom was constructed as a problem in mechanical drawing, each child making and stringing his own, while the weaving, with the use of one "heddle" was strictly "handwork" so called.

The materials used were straw board, twelve inches long by six wide; two brass rings, three-quarters of an inch in diameter; two balls colored twine (called "floss" in the market), which two children used, the color used in the stripes by one forming the body of the hammock by the other and vice versa; a tape needle; and a school ruler for the "heddle."

As the problem in design is well known, or can be found in Mr. Arthur W. Dow's book on design, it will not be described here.

To make the Loom. Draw a rectangle, 5 in. by 9 in. Fig. 1, A B C D. On its short sides—B C and A D—place dots one-fourth of an inch apart. Find its center, G, by drawing diagonals. With G as a center and radius, G B, equal to half the length of the diagonal, draw arcs, B E C and A F D, connecting the corners of the rectangle. If compasses cannot be used, a "circle-maker" made by the children is a practical substitute and works better in the

Fig. 1



hands of little children. Draw parallels to the longsides of the rectangle, through the dots one-fourth of an inch apart, and extend to arcs. At the points of intersection of straight lines and arcs prick holes. On the center line place dots one-fourth of an inch each side of center and prick holes.

To string the Loom. Take the two rings and tie together and then tie to centre of loom by passing ends of cord through holes which have been pricked one-fourth of an inch from center. Fig. 3. Take a long needleful of twine, tie one end to a ring, pass needle through upper corner dot, turn the

loom and pass through opposite lower corner dot, then through other ring, back through second lower dot,

Fig. 2.

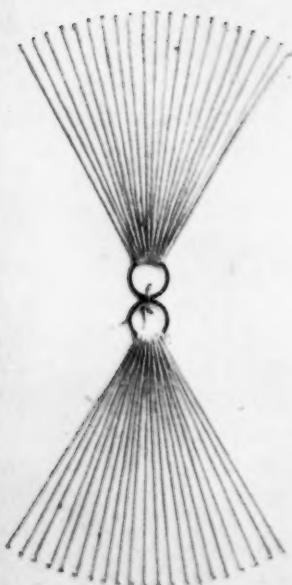
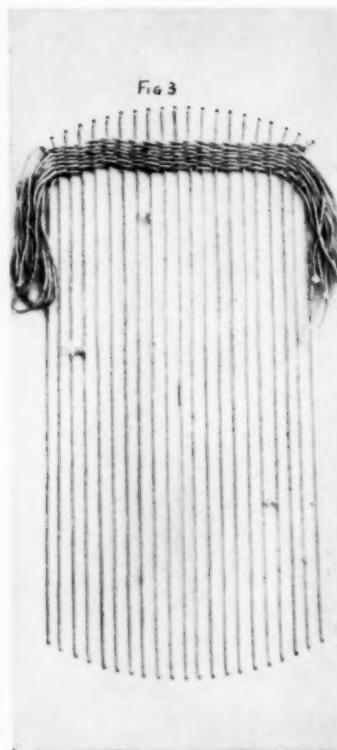


Fig. 3.



then through second upper dot, through ring, back through third upper dot, and so on, until all the

holes are strung with straight parallel strings on one side (Fig. 3) and oblique strings from holes to the rings on the other. (Fig. 2) Fasten by tying to ring. When piecing the twine, do so by tying on the side on which are the parallel strings, as the knots will then be covered by the weaving. It makes a more finished piece of work not to piece the string, but to keep it whole by pulling the twine through on the side of the parallel strings, as needed, and leaving the tying of the strings to the rings until all is strung. But in teaching large numbers this would complicate the problem, although some of the children, in working out a copy of the hammock at home have discovered this improvement and adopted it.



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To Weave. Take the loom the long way, wind with twine and cut at one end to make weaving strings twice the length of the card.

Make a selvage by doubling the string in the centre and crossing it between each string of the warp, so that the string that was under becomes the upper one each time. This is called pairing, or "single twist," in basketry. See Fig. 4. (This may be omitted). Pick up every other thread of the warp with the ruler, which forms the "heddle" and lifts one set of threads, then turn it up on its long, nar-

row side to form a "shed" and pass through a piece of twine threaded into a tape needle. Put down the heddle and weave back, under and over, leaving the thread beyond the warp each side to form a fringe. Pack by pressing the threads closely together with the ruler.

The weaving may be done as well with the needle, but in the case of our schools we were leading up to the Navaho loom, in which two heddles are used, so that the knowledge of one heddle was a necessary help to the more difficult use of the two to follow.

To tie the Fringe. Hold the loom the long way and at right angles to the worker. Begin at the bottom and tie a knot, as in Fig. 5. Even the fringe, cut the rings off the loom, and tear the loom away from the hammock.



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ACTION DRAWING

II

FORM AND PROPORTION



IMS of first importance in drawing are four in number: First, to give more clear and definite ideas of form; Second, to develop skill in the use of the hands; Third, to teach the art of drawing—how to represent form on a flat surface with lines and color; Fourth, to give a medium through which to develop the imitative, constructive and æsthetic instincts or powers.

It will be seen from the above that drawing is no more a medium for the artistic and æsthetic than language, number or music.

Because of the general belief that drawing and the æsthetic are synonomous terms is responsible for two unfortunate tendencies: The first is to keep a large class—the largest class—from learning the art of drawing. A class who care little for artistic excellence but who would like drawing as a means of expression and as an aid in their other work. Secondly, it has a tendency to keep pupils and teachers from giving due prominence to the mechanics of drawing, to principles and methods and the mechanical means of gaining results. The tendency is to trust the object as if it had the power and intelligence to show how to reproduce itself on a flat

surface. The object or model is the source of the mental image but it has no power to show how to reproduce this mental image, that belongs exclusively to the copy, which is a product of mind.

The above is especially true in drawing the human figure. All wish to draw it but fear of the difficulties, and inadequate preparation make the efforts void except to the special student.

To be able to draw the human figure the following elements should be taken into consideration:

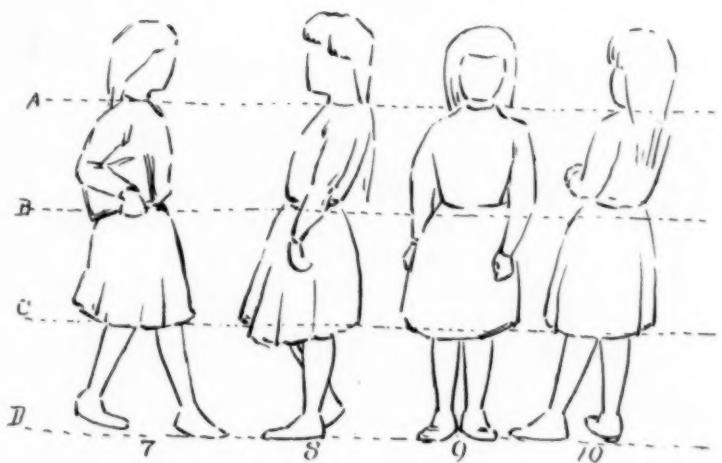
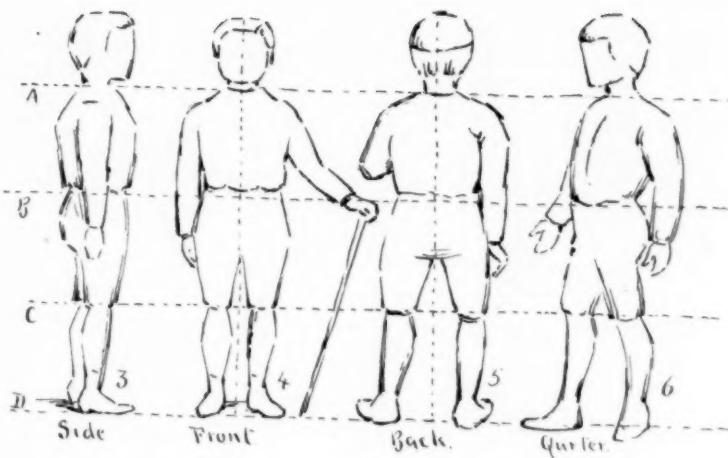
The Action or Life element.

The Form and Proportion elements.

The Drill exercises necessary to acquire the above elements.

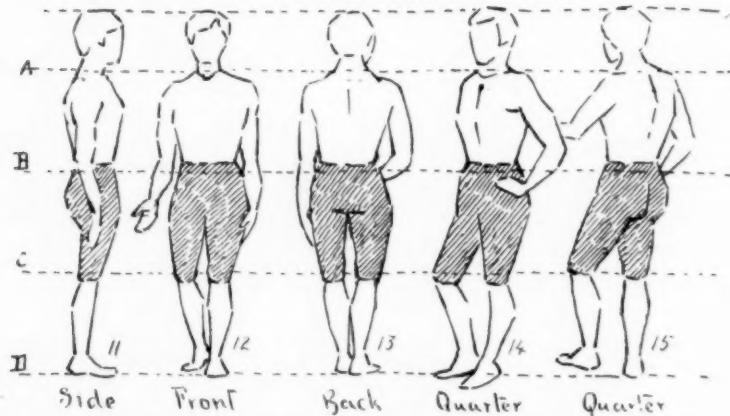
The article on the action or life element appeared in the March number of this Magazine. In this article a basis for the study of the form and proportion elements is given.

There is no exact method for drawing the human figure, its proportions are so subtle and the variations in individuals so great that an exact rule is out of the question. The drawing of the human figure must be based on the judgment assisted by such methods and aids as will help bridge the difficult points. Next to the action element the form and proportion elements give the most trouble. Both of these should be overcome through the copy, then verified and perfected through the model.



The following is an excellent method to overcome the above difficulties.

Draw four light horizontal lines equally distant apart as A B C and D, Figs. 3-15. These equal spaces will divide the human figure into three nearly equal parts called the body, the thigh and the leg.



The body in this division extends from the collar to the belt, the thigh from the belt to the knee, and the leg from the knee to the bottom of the foot. These are natural divisions and are usually discernible at a glance. Preference in length is given to the thigh. These three divisions will act as a guide in determining the general proportions.

Observe in Figs. 11-15 the following points: That the thigh is given the preference in length.

That the body in the front and back views is nearly a square.

That the leg including the foot is about the same length as the body, and the foot is one-half the length of the leg from the knee to the bottom of the foot.



The head including the neck is more than half the body in length and is put in place by the judgment alone.

The whole arm including the hand reaches about to the middle of the thigh. The elbow reaches to the belt.

These proportions are but general aids to the judgment and are not to be taken as exact rules.

Draw the human figure in the following order: (1) Represent the action. (2) Draw the body. (3) Draw the thigh and leg. (4) Place the head and neck. (5) Draw the arms and hands. The above plan is not arbitrary.

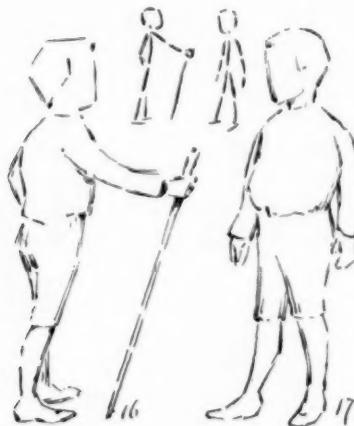
Figs. 1 and 2 show how to proceed from the action to the form and proportion elements.

Figs. 11-15 give the general method and show the principal standing positions of the human figure.

Figs. 3-6 show the plan as applied to boys and Figs. 7-10 to girls. Figs. 16 and 17 show figures without the division lines.

Do not depend on the method too much but rather use it as a help.

Remember that all the methods and show-hows in the world cannot take the place of the actual drawing. The proper way to learn how to draw is to draw.



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ANNOTATED OUTLINES

APRIL

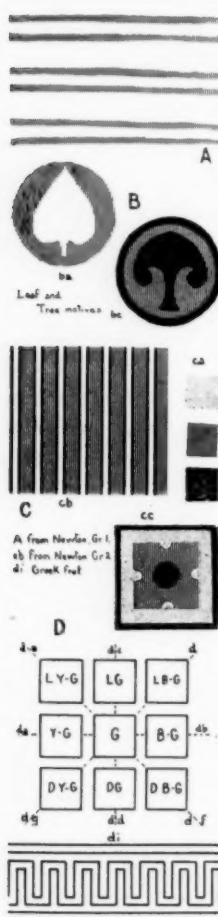
GENERAL TOPIC, COLORING



OLOR was one of the first topics considered at the opening of the school year. It has played an important part, especially in three primary grades, in almost every month's outline since September. The effort should now be made to systematize such knowledge as the pupils have acquired and to utilize it in Coloring. By Coloring is meant the use of color for its own sake to produce pleasing color effects. The exercises outlined this month are preparatory to the study of the spring flowers and the use of decorative elements in design. The aim should be a keener appreciation of fine coloring and greater skill in producing it.

PRIMARY. First Year A. Review the spectrum, and the names of the six colors, R. O. Y. G. B. V., collect illustrations of the stripe pattern in design. On white paper draw stripe patterns using a single strong pure color for each.

The skilful primary teacher will have no trouble in arousing interest and enthusiasm in the study of striped goods for dresses, shirt-waists, ribbons, etc. The examples collected by the class should be classified according to colors. Which are more pleasing, the narrow or the broad stripes? Close together, or far apart? In drawing each pupil may select his favorite color. The stripes should be drawn with



a brush full of color, and at a single stroke without retouching. Try for uniform brilliancy in color and equidistant spacing. Geometric figures may be filled with color.

Second Year. B. Review color names and terms, scale, tint, full color, shade. Within simple outlines traced carefully from patterns, make flat tones of color. Within geometric figures, the circle and rectangle, trace some ornamental figure. Color the ground with a flat tone of color leaving the ornamental figure in white or coloring it black.

Collect examples of spot patterns, limiting the collection to those of simple outline in a single color on a white or black ground, or in black or white upon a colored ground. Which are more pleasing, those in color upon white and black, or those in white and black upon color? In coloring strive for perfectly flat tones with clean sharp edges. If the spot is black on a colored ground the ground would better have a strong black outline around it; if in white on a colored ground (the whole being on white paper) no such outline is required. Why? Which is more pleasing with white, a tint, the full color, or a shade? Which is more pleasing with black? Is the same true for tints and shades of all the colors? If not, why not?

Third Year. C. Review color names and terms, the six standard colors and the six intermediate hues, scale, tint, full color, shade. On a tinted ground make stripe patterns by using the full color or a shade of the same scale. Make three tone scales with tint and shade equidistant in value from the full color. Apply the three tone scales in a simple ornamental form.

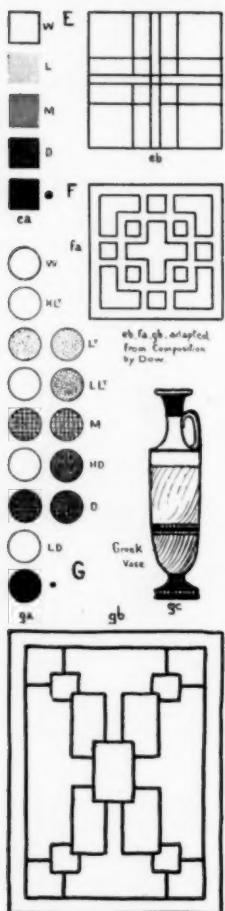
Collect examples of patterns colored in two or more tones of one scale, with or without white and black. Classify these according to color family, red, orange-red, etc. Which are the more pleasing, those including black or white or both in the group of tones, or those with tints and shades only? Why? If black is included is it better when the other tones are the full color and a shade, or when tints are included? With what group of tones is white most satisfactory? Why? The stripe patterns may include white and black. The full color selected for the central tone in the three toned scale may be a standard or a standard hue. The tint and shade must be, of course, in the same vertical scale. The tint should be as much lighter than the full color, as the shade is darker than the full color. In the ornamental forms, cc, match perfectly the tones of the three toned scale, ca.

INTERMEDIATE. Fourth Year. D. Review color names and terms, especially the terms warm and cool. Make three tone scales of analogous colors. Apply the three tone scales in simple ornamental forms.

Collect examples of patterns colored in analogous hues, with or without white and black. Classify these according to the dominant tone, green, blue-green, blue, etc. Practice several times such a diagram as that shown at D. Select any color as central, make a tint above it and a shade below it, equidistant. Make a hue at the left

APRIL

OUTLINES



warmer than the central color, and a hue at the right cooler than the central color. Let the more rapid workers try to make a tint above and a shade below each of these side colors. Colors on the line da-db are analogous colors varying principally in hue; colors on lines parallel to dc-dd form vertical scales varying in value only; colors on diagonal lines de-df, dg-dh, form diagonal scales, varying in both hue and value. Select a pleasing group of analogous tones from the collected examples, and match the tones in water color. Trace a border, di, and color it using three tones of some diagonal scale. Try others.

Fifth Year. E. Review color terms. Make a scale of gray including white, light gray, middle gray, dark gray and black. Make scales of color in three values between white and black. Apply these in geometric patterns. Find applications in nature and art.

The scales should be made as follows: Lay out the scale, a series of circles or rectangles, in pencil. Color the lowest spot black. Next fix the middle value exactly halfway between white and black. Determine by experiment the exact value of the light spot, and lay that wash. Finally determine the dark value and complete the scale. The best scales for pupils of this grade to experiment with are the red and green scales. The others are more difficult.

The gray scales should be made first and used as a key to the values in the color scale.

The geometric pattern, eb, may be drawn and traced several times and different arrangements of the tones made to determine the most pleasing. In one, the light tone may be dominant, in another the dark tone, in another the middle tone.

Review the life drawing of last month and find an application of similar group of tones. Make the drawing in color.

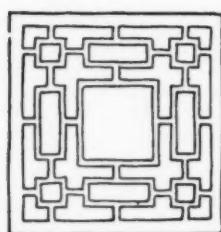
Sixth Year. F. Review color terms. Make a scale of gray including white, light gray, middle gray, dark gray and black. Make scales of three analogous tones between white and black, such for example, as these: middle blue-green, light green, dark blue; middle orange-red, light orange, dark red. Apply these in coloring a simple rosette. Find applications in nature and art.

Lay out the scales as suggested in the previous grade, ea. Any color in the middle value may be selected as the central tone in an analogous scale. The light tone should be as much lighter and warmer than the central color, as the dark tone is darker and cooler, or the light tone as much lighter and cooler as the dark tone is darker and warmer.

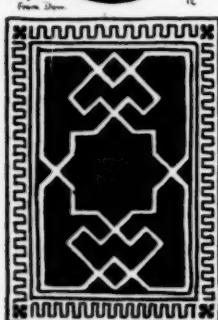
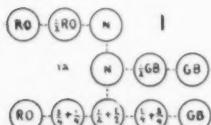
The rosette, fa, should be drawn and traced several times and several different colorings made as suggested in the previous grade.

Review the life drawing of last month and find an application of similar groups of tones. Make the drawing in color.

GRAMMAR. Seventh Year. G. Review color terms. Make a scale of gray including white, light gray, middle gray, dark gray and black. Make another scale of five tones including light gray, low-light gray, middle gray, high-dark gray, and dark gray. Make scales of color in these five values.



From drawing by H. Hazel Holmes
Melrose, Mass.



Apply in a geometric pattern, or some object.

Lay out the scales as follows: Draw a light vertical line 12" long; fix the middle point, place other points above and below $\frac{1}{2}$ " apart. With each point as center and a radius of $\frac{1}{2}$ " draw the nine circles, ga, mark these as indicated (the nomenclature used by Dr. Ross). Tone the scale as before, white, black, middle gray, light gray, dark gray. By the side of this scale draw another and tone it to correspond with the first in its light, middle, and dark tones. Experiment to fix the low-light tone midway between light and middle value, then the high-dark tone midway between dark and middle value. When this five toned scale is as nearly perfect as possible make a similar scale in some color, matching the middle value first, then making the tones above and below.

Apply this scale in coloring some pattern, gb, or some object from nature or the arts, gc. Trace the outlines and try several arrangements of the tones. Try an application in beads.

Eighth Year. H. Review color terms. Make scales of gray as outlined in previous grade. Make scales of five analogous hues in the five values from light to dark. Apply these in a geometric pattern or some object.

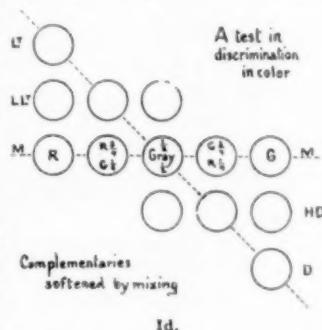
This work differs from that of the previous grade only in requiring a finer discrimination.

The color scale has a gradation of hue as well as value. This scale of analogous hues is a favorite with nature. Applications are abundant, and need not be limited to any one field. Try an application in embroidery.

Ninth Year. I. Review color terms. Experiment with three pairs of complementary colors, red and green, orange and blue, yellow and violet, and make scales of three tones each including a standard color, a gray of corresponding value, and a tone half way between the two in intensity of color. Make scales of five tones by mixing complementaries. Apply these in coloring patterns or objects.

Lay out the scales as indicated at ia and color them as suggested by the abbreviations. Notice that the quality of a gray made by mixing complementaries is not quite the same as that produced by mixing black and white. Why? Which is the more pleasing when used in design? Why? Which are the more pleasing, groups of tones those which include the pure complementaries, or subdued complementaries? Why? Make other diagrams similar to ia and Id and translate them into color. Which is more pleasing in effect, a group of tones taken from the horizontal line M, or from the oblique line Lt-D? Why?

The application may be from any field. The designs given, ib and ic, are simple and effective when well colored. Apply in embroidery, or some other form of needlework or in a design for a dress sketched in water color.



HIGH SCHOOL. Both the freehand and mechanical classes should have instruction in color. The first problem may well be the making of the nine toned scale in gray, as shown in the supplement this month. It would better be made to hang as a vertical scale. The second problem is the laying out, mechanically, of the complete color chart, three times the size of that given in the supplement. The third is the making of color scales. The fourth is to color some design according to the color chart. No better series of exercises for training the color sense has yet been devised.

Having made the nine toned scale in gray, the method of procedure is as follows: Lay out a similar scale in pencil. Color the black spot. Place the standard color selected where it belongs in the scale (yellow at high light, or green at low light, or blue-violet at dark, etc.). Complete the scale with the correct values of the color to white and to black.

In coloring a design decide first upon the *hue* which the finished whole should assume (the effect should be a yellow, an orange-red, or green,— whatever is desired). Next decide upon the *value* which the finished whole should assume (it should be light or medium or low dark,— whatever is desired). The problem now becomes that of selecting those tones for the larger areas of the design which shall produce the desired effect. The smaller details of the design may properly have the tones farthest removed in hue and value from the dominant note.

HELPFUL REFERENCE MATERIAL FOR APRIL WORK

Brush-work. Mrs. C. West Van Helden. Colored plates. Good book for beginners. Milton Bradley Co.

Color. (From the standpoint of the physicist). Ogden, N. Rood. Text-Book of Color, and Color, by A. H. Church. Elementary Color, by Milton Bradley, has helpful suggestions for the use of colored papers.

Color in Elementary Grades. Ernest A. Batchelder. Year-Book; Council of Supervisors, 1902, p. 13.

Coloring. Helpful plates and suggestions in Composition in Fine Art. Kettelle. Color in primary grades as discussed by Henry Turner Bailey in Applied Arts Book, October, 1901, and in intermediate grades in November, 1901.

Colors. The twelve zodiacal colors. Ruskin. Laws of Fesole, Chapter VII. Color, Lectures on Art. VII.

Course in Water Color. Full of helpful suggestions. Excellent colored plates. Clear directions to beginners. Prang Educational Co.

Decorative arrangements suitable for coloring. Dow. Composition.

Examples in Color, for copying. Grammar of Ornament, Owen Jones. Polychromatic Ornament, Racinet. Plates of Historic Ornament, Prang. Japanese Prints, Bunkio Matsuki.

Painting. Art Instruction for Children, Mary Dana Hicks, Chapter VI. (Prang).

Teaching Color. Augsburg's Manuals, I, Chapter XIII.

The Little Artist. Marion Mackenzie. Colored plates with descriptive text, specifying colors to be used, etc. Milton Bradley Co.

Water Colors. How to use them. Augsburg's Manuals, III, Chapter III.

THE SCHOOL LIBRARY



HOWEVER rich in books the school library is practically worthless unless it is used. If it contains books which are never read, sell them and buy others. Some large books render good service when cut apart and rebound in small parts or chapters.

Books containing many plates are often most valuable when dismembered that the plates may be used separately. One book of this class which ought to be in every school library is Owen Jones' Grammar of Ornament. A copy of the original edition of this wealthy volume, published by Day & Son, London, 1856, is of course, out of the question, but a copy of the edition of 1868, published by Bernard Quartritch, may be found occasionally, and had for twenty or thirty dollars. A copy is worth having at almost any price for it is an encyclopedia of decorative patterns in colors. The plates, one hundred in all, are upon heavy paper, numbered consecutively, and of a convenient size. The text bound separately would make a handsome illustrated volume, all but complete in itself. The school is fortunate indeed which has such reference material at hand.

Pen and Ink Drawing. George Hartnell Bartlett.
Riverside Press, Cambridge, 1903. Size 11 x 14,
224 pp. 52 plates. \$7.50.

In these days of sketchy illustration, often trashy, of "suggestion" and "effect," in place of description and solid excellence, a book like this by the well known Principal of the Massachusetts Normal Art School is sure to have an influence for good. The book gives examples of pen drawing in every degree of elaboration, from the rapid, vigorous outline sketch to the most accurately descriptive study of texture, modeling, and atmosphere. Some of the plates are marvelous in their technique; granulation, lustre, glisten, translucence, are produced by the pen alone, with a degree of perfection and with a directness of handling not often found even in the best wood engraving. The descriptive matter accompanying the plates, as concise as it is, may be reduced to two sentences: These drawings were from the object direct, and have been reduced one half [or whatever the amount may be; it is always stated]. To learn how to produce such effects, study the plates. The running text, after two chapters on line drawing, gives a concise resumé of the history of illustration, and describes the processes in all the important reproducing arts from engraving on wood to the three-tone photographic plate. In an appendix the author discusses Nature as the Source of Inspiration for Composition, and Art and Art Schools.

This book is a valuable addition to the literature of the subject. Its plates of architectural details are models for students in manual arts high schools. Its plates of tree anatomy and foliage are models for students in advanced freehand classes. As examples to be studied for the rendering of textures, the birds' heads, the cows, the feathers, the dog's head, and the Gothic frieze, can hardly be equalled. No other book gives brief intelligible accounts of all the reproducing processes, and no other shows so completely the possibilities of the line plate, the most direct and least expensive method of reproduction.

The book is a masterpiece in printing. The plates have a clearness and brilliancy of color almost equal to original drawings, although text and plates were printed together upon the same unglazed paper. Every school, college and public library should contain a copy of this work.

EDITOR**SCHOOL LIBRARY**

Pictorial Composition and the Critical Judgment of Pictures. Poore. The Baker and Taylor Co. 1903. Revised. Size $6\frac{1}{2} \times 10$, 282 pp. Illustrated. \$1.50.

The second edition of this excellent book, reviewed in the January number, is most welcome, not only because it indicates a gratifying sale, but because the new edition is thoroughly referenced, has an index, and has been enriched by the addition of eighteen illustrations, and an appendix which reduces the argument of the book to a working basis. There is no better book upon this subject for the enlightenment of upper grammar and high school pupils, or any one who wishes to know about pictorial composition from the artist's point of view.

Report of the Commissioner of Education for 1902.
Vol. II. 1272 pp.

The chapters on Education in Porto Rico and Education in the Philippines contain a brief account of the introduction of industrial education. The teacher of Nature Study and geography will be interested in the chapter on the introduction of the reindeer into Alaska. The volume is filled with statistical tables giving, among other information, that concerning the technical schools, "mechanical colleges," and schools of manual and industrial training throughout the country.

THE MARCH MAGAZINES.**Booklovers.**

Famous Parisian Artists in their Studios is a novel article, for it is practically without text; but to a close observer it tells much about Bouguereau, Constant, Gérôme, Weeks, Barrias, and Fremiet, which could not be said any other way. Four Notable Pictures is another almost textless article. The illustrations are in color, the best, Gulliver and the Lilliputians, by Vibert, is a charming interpretation of that famous story. The Landscape, by Innes, while it suggests the

technique, does not give the depth and richness of color usually attained by that artist. The other pictures are Feddersen's Artist's Daughter and Friant's All Saints' Day. F. C. G. Cartoonist, by James Douglas, is an enjoyable account of the work of the most influential man of his class in England. All teachers in geography will prize The Two Pacifics, by Harold Bolce, rich in illustration and diagram. The Old Guard of New England, by George Perry Morris, is valuable to teachers of literature, and Fateful Presidential Conventions, by Joseph M. Rogers, and Round about Old Jamestown, by Clifton Johnson, to all teachers of American history. The note on Automatic Drawings, with illustrations, raises a hundred questions, and need not be taken too seriously by teachers of drawing.

Century.

The frontispiece, Pius X, by George T. Tobin, is an attractive piece of work, both for its color and its modeling of a face in shade. Castaigne's illustrations for Cleveland Moffett's article on The Paris Bourse are excellent, of course; some of them being treated so that the student is allowed to see with more than usual clearness his method of manipulating the medium. The two examples of wood engraving, pp. 667 and 686, should be compared for "handling" of foreground, clothing, and other textures. Compare also the handling of the pen as shown by Seaton, p. 751, Miss Partington, p. 743, and Richardson, p. 739. Church draws a fox, p. 772, almost as human in intelligence as Seaton and others would have us believe him to be, notwithstanding the persistent efforts of John Burroughs, whose remarks in this number On Humanizing the Animals are entertaining. How such a sentence as this comes home to the teacher of drawing! "Good observers are probably about as rare as good poets. Accurate seeing—an eye that takes in the whole truth, and nothing but the truth—how rare indeed it is!"

Country Life.

The first article, Flowers for Every Place and Purpose, by M. G. Kains, is just what the teacher has been looking for whose school-yard is a gravel bank, or a bog, a shaded hillside or a sun-baked square.

The Arnold Arboretum is handsomely treated by Wilhelm Miller and two of his photographing friends, under the caption, The World's Greatest Tree Garden. The Gladiolus and How to Grow it, The Late Planted Garden of a Tenderfoot, Gardening versus Sewing, and An Amateur's Rock Garden, are all immensely suggestive. But the article of the month for the drawing teacher is A Garden of Sweet Herbs, by Ellen Watson, chiefly on account of the charming photographs by J. Horace McFarland. His "Fennel," p. 398, is perhaps the masterpiece, but the entire set of thirteen is worth preserving for suggestions in arrangement within given spaces. On page 416 is a good article on How the Children of the Franklin School in Washington Improved their School Grounds.

Craftsman.

Every supervisor needs the March number of this magazine, first, for the splendid article on Rodin, written by Jean Shaffer and Claude Anet, and translated from the French by Irene Sargent. It is good reading; it is of great value as revealing the point of view of one of the greatest living sculptors; it is richly illustrated. Second, for the article by Verneuil, translated by Miss Sargent, on The Insect in Decoration, as full of delightful suggestion as a May morning. There is also an illustrated Plea for the Decorative Book Plate, by Frank Chouteau Brown, and an illustrated exposition of the Basketry of the Alutian Islands, by C. Gadsden Porcher. The Indians of the Southwest continue to be made known by George Wharton James, and Craftsman houses and cottages are still building, on paper. The cottage is less startlingly original than the house, and therefore productive of greater anticipatory content in the mind of the castle-building reader.

The Commercial Value of Design by Frederick S. Lamb, furnishes arguments such as supervisors who have constituencies to educate are constantly looking for. A False effort to be Fine is for those who have a zeal for art but not according to knowledge; and Canvas Curtains with Linen Appliquéd is for those who love "fancy-work" but fancy the wrong sort of work.

Chautauquan.

The sixth in the series of articles on American Sculptors and Their Art, deals with Contemporary New York Sculptors. There are eight illustrations, among them Paul Bartlet's great Michaelangelo of the Congressional Library. The two articles dealing with the civic renaissance in Harrisburg, Pa., furnish valuable reference material for those interested in the Town Beautiful. Arts and Crafts in Technical Schools by Henry McBride, is the seventh in a series of nine illustrated articles on The Arts and Crafts in American Education. The first wildflower, the skunk cabbage, and the first butterfly, the mourning cloak, are briefly discussed by Anna B. Comstock.

Harper's.

No feature of the modern magazine is of greater interest, from the point of view of the teacher of drawing, than color printing. Three of the lines along which experiments are being made are illustrated in this number; black with a ground tint, pp. 545, 549 and 552; black with tint used in patches, pp. 624 and 630: straight three tone prints, frontispiece and p. 584. Of these the last, by F. C. Yohn, is perhaps the most successful. The man with the red shirt and the friar, are charming color. Elizabeth Shippen Green's drawings, of which there are nine, are sufficiently frank in handling to enable high school students to see how they are done. That on page 595 is a novel and rather successful treatment of apple blossoms. Insect Commonwealths, by Henry C. McCook, is of interest to teachers of nature study, and The History of the Alphabet, by Henry Smith Williams, to teachers of lettering. Alice Barber Steven's boys illustrating Little Rugby will suggest interesting attitudes in pose drawing.

House Beautiful.

A tail piece at the end of the first article is simple in treatment and sufficiently amusing to inspire children to similar work. The History of Tapestry, by Miss Chappell, is all too brief—almost as concise as a chapter of "Ploetz' Epitome." It has four illustrations from tapestries, three in the Museum of Fine Arts, Boston. Art-Craft Work in a College Art Department, deals all too briefly, again,

with what is doing in Newcomb College. What to put on Library Walls, by Isabel McDougall, may help those selecting decorations for the school library or reading room. Willard Clocks by Virginia Robie, give five good clock designs for manual arts students to see.

McClure's.

It is interesting to compare the illustrations by Charlotte Harding, beginning on p. 505, with those by Henry Hutt in Harper's, pp. 624 and 630. Miss Harding's seem less artificial in the use of the tint, especially in the drawing which serves as a heading for the article. In such a case as that on p. 509, the mind involuntarily looks for a difference between the tint of the magazine in the foreground and that of the screen in the background. This number is valuable to the teacher of drawing chiefly for its pen drawing. Compare the direct handling and sunny effects in W. D. Steven's drawings, pp. 518, 525, with the more involved and grayer work of Carwin K. Linson, pp. 534 to 544, and with the still grayer but more legitimate pen work (Linson spatters and scratches and uses prepared papers) of Will Crawford, pp. 554 to 560.

New England.

The Pleasure Gardens of Rome, by Felicia Buttz Clark, furnish some good Italian tree forms, the stone pine, ilex, cypress, and palm. In the Kentucky Mountains, by Lillian W. Williams, enables one to form a clearer picture of the conditions out of which come the bed spreads and the linsey-woolsey fabrics without which no modern art-craft exhibition is complete. Colonial School Books, by Clifton Johnson, is good "supplementary reading" for teachers.

Outing.

The pen drawings by Ray Brown, pp. 641 to 647 should be compared with those in McClure's. They are one degree simpler in handling than those by W. D. Stevens. Compare also the handling of the pen by H. McBurney, p. 669, with that crisp bit of work by Max Klapper, p. 674, and with the very clever drawings by Martin Justice, pp. 676 to 679. The half tone from a photograph by V. Gri-bayéoff, p. 694, is a good example of composition with heads at the

same level. There are two moose drawings in this number which belong in the "animal box."

Scribner's.

This is the magazine of the month for one interested in black and white drawings. It contains some of the best and the most perfectly printed, by Howard Giles, F. C. Yohn, Christy, Jessie Wilcox Smith, C. T. Chapman, Henry Reuterdahl, George Wright and Harrison Fisher. Fisher draws marvelously pretty girls, with faces full of expression, without exaggerating a single movement of a muscle. Compare page 360 and 364. The series of drawings by Christy, Music and Life illustrate forcibly what he can do in the rendering of textures by the simplest means, and with what facility he can suggest the character, the spirit, the state of mind at the moment, of any of his creations. Throughout the series there is not a conventional or expressionless face. The ground tint is used with charming effect in this number, especially on pp. 305, 311, 312, and 327.

St. Nicholas.

One of the cleverest drawings is "Scream, Mum!" p. 413, by Miss Cary. The spot patterns of stockings and dresses are a happy accessory. W. Benda's drawings for The Gentle Giant give the spirit of the poem well. The head-piece especially is original and effective as a composition. How Daubigny Decorated his Little Daughter's Room is well told by Valeria Inez Merrill. A. B. Craig's Windy March to School might be used as a copy for grammar pupils to render in color. The Blacksmith Nation, by W. S. Harwood, should be read by all teachers of geography. The three little kittens on page 449 are worthy of Mme. Ronner! The Nature and Science section is, if possible, more interesting than ever. It contains drawings of whales, ornithostomas (?), juncos, a cecropia, a spider, monkey, starfish, a downy woodpecker. Miss Baillie, a half-tone from a pastel by J. Wells Champney, after the original by Gainesborough, makes an appropriate and pleasing frontispiece for this best of children's magazines.

Studio.

This magazine is always invaluable to the supervisor. It is *full* of good things every month. This month's number is notable for the Whistler in color, the portrait of the little girl by George Henry, the crayon drawings of the Oxford Colleges by V. H. Bailey, the medals by Rudolph Mayer, and the Portrait by Cecilia Beaux. There is an article of absorbing interest by Henri Frantz on Victor Hugo's Drawings, richly illustrated. The Photographic Work of W. J. Day, and the paintings of Albert F. Fleury exhibit almost equally the beauty of the commonplace. Fleury discovers it in Chicago and Day in the sea and sky. But why discriminate? A live supervisor will find something helpful on every page.

World's Work.

The leading educational article of the month is The Ideal Schools of Menomonie, by Adele Marie Shaw, profusely illustrated, the best single print being that of Senator Stout, the man behind not only the school system, but the movement for civic beauty which has made this little Wisconsin city famous. In Ballooning over the Alps, one finds an original bit of notan on page 4581. Ten Years' Advance in Railroading is good supplementary reading for the history classes, and the home of Yun-Woong-Niel, p. 4523, is good reference material for the class in "space division."

EDITORIAL



EVER in the history of our country has there been such an interest in color as now. The interest is not confined to color in dress, home decoration, or three-tone color plates; it extends to every use of color from bead stringing to landscape gardening, and from job printing to tapestry weaving. During the last five years, the phenomena of color have been re-investigated, and theories of color combination have been revised again and again.

The most prominent workers along these lines are Mr. Albert H. Munsell, of the State Normal Art School, Massachusetts, and Dr. Denman W. Ross of Harvard University. Both men are trained artists, and both are painstaking students. The results thus far secured by these men are not so different except in the objective forms into which they have been cast. Mr. Munsell has chosen the sphere as his diagram, and Dr. Ross a sort of Mercator's projection of the sphere. One is a three-dimension diagram, and the other shows the same facts in two dimensions. There are slight differences in nomenclature, and in the hues selected to mark certain intervals, but the systems compass the same end; and each elucidates and complements the other. Dr. Ross has suffered a storm of criticism for his supposed inconsistencies, but

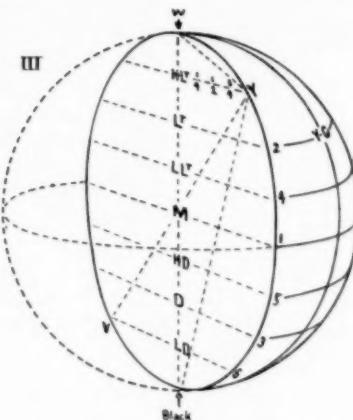
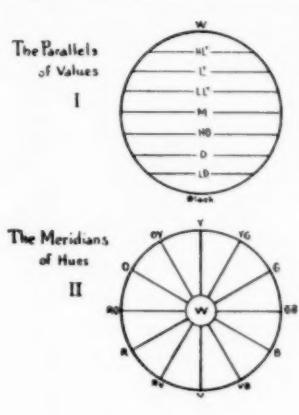
knowing the great needs of those engaged in teaching, he has been willing to share each point gained in his experimenting with all who could profit thereby; his progress has been their progress; he has been for four years the most helpful and inspiring influence in the country in color teaching. His system produces everywhere tangible results. Mr. Munsell has pursued a different course, and the splendid results of his experiments, and his inventions, have not even yet been made known to the public. Teachers everywhere await with great expectation the publication of his achievements. Meanwhile the public schools must keep shop with such goods as they have.

THE NOMENCLATURE OF COLOR

The whole discussion of color and color teaching has been confused and confusing for lack of an accepted nomenclature. The present state of what will be some day the science of color, and the most widely accepted terminology now in use, may be made clear through an explanation of the following diagram, the supplementary sheet, and the colored plate which forms the frontispiece this month.

We will proceed, defining as we go.

TONE: That quality by which things become visible to the eye. All objects have a certain tone for the eye, as all sounds have a certain tone for the ear. The eye perceives differences in tone. There are tones commonly called colorless—tones of GRAY, and there are



tones of COLOR. All known tones may be thought of as forming a sphere of tones, III, with white at the north pole, and black at the south. Upon the axis of this sphere would be a series of tones graduated from white to black. For purposes of classification nine of these tones have been selected by Dr. Ross and designated as follows: White, high light, light, low light, middle, high dark, dark, low dark, black (see supplement). These nine tones are supposed to be at equal intervals between white and black. They form a

SCALE; an orderly series of tones.

Each tone has a certain

VALUE; the quality of a tone with reference to white and black; and is designated accordingly as light tone, middle tone, dark tone, etc. These nine tones form the scale of Grays or

NEUTRAL SCALE, as shown in the supplement in the lower part.*

* It should always be thought of as a vertical scale, the white being at the top and the black below. It was placed horizontally here for the sake of making it large enough to be of practical use in teaching.

For convenience six prominent colors of the spectrum have been selected and designated as

STANDARD COLORS: Red, orange, yellow, green, blue, violet.* Three of these, red, yellow and blue, are sometimes called Primary colors, because in painting the others may be made from them. But the others, Orange, Green and Violet, are sometimes called Primary colors by the scientists, because by mixing light the others can be made from them. Six others, intermediate between these, have been selected and designated as

INTERMEDIATES: Red-orange, orange-yellow, yellow-green, green-blue, blue-violet, and violet-red.† These and all other intermediates, of which the number is indefinite, are commonly called hues. But strictly speaking, the term

HUE—the quality of a tone with reference to other tones of color, is equally applicable to all tones of color. Upon the surface of this sphere (III) tones of color would appear, viewed from above the white pole, as at II. The Standards and Intermediates would be seen to occupy the meridians, equidistant from one another, as indicated by the abbreviations.

Tones of gray, or neutrals, can vary in value only, that is, they may appear as lighter or darker; but tones of color may vary in three ways. They may vary in Hue (one tone may be redder or greener or bluer than another); they may vary in Value (one red may be darker or lighter than another red, a yellow may be lighter than a green); and they may vary in

INTENSITY; the quality of a tone with reference to itself at its best. (Mr. Munsell uses the term Chroma and others use Saturation). Of several yellow pigments, for example, one will give the purest, brightest, *yellowest* yellow we know of at the present time. All other yellows are less yellow than this, are less intense. Then,

* Various attempts have been made by Milton Bradley, and others, to locate definitely these six colors in the spectrum by measuring the wave length of each, as standard pitch in music is determined by the number of vibrations per second.

†This last not found in the spectrum, but elsewhere in nature.

too, the pigment may be so diluted with white, black, or gray, that it does not appear at its best: its *intensity* is reduced.

Now it so happens that standard yellow, for example, at its fullest intensity, has the *value* of high light gray; and that red-orange at its fullest intensity is in the middle value; and that violet at its fullest intensity has the value of low dark gray.

From this it follows that pure yellow must appear on its meridian in a very high latitude, so to speak, as high as the latitude of high light (Y on diagram III) and that pure violet must appear on its meridian in a very low latitude, as low as the latitude of low dark (V on diagram III). A little reasoning will reveal the fact that if the other Standards and the Intermediates are spaced equidistantly between these two, they must come to their fullest intensity, each on its own meridian, in a great circle of the sphere passing through Y, Y-G, G, etc., to V, and around to Y again, and corresponding roughly to the ecliptic. In Fig. III a section of such a color sphere is suggested, the cut being made on the yellow and violet meridians, the parallels of values and the meridians of hues being indicated on a portion of the surface.* By comparing the Theory of Tone-Relations given in the Supplement with this sphere it will be seen that the vertical lines of the triangles correspond in each case with the vertical axis of the sphere, and that the other sides of the triangles correspond with lines which might be drawn from a spot on the surface of the sphere, as Y, for example, to the poles. The triangles might properly have been semicircles, but again that would have complicated the diagram needlessly. If the point on the surface of the sphere at Y marks the position of yellow at its fullest intensity, and the point HL_t on the axis marks the position of gray of the same value, it is evident that between Y and HL_t, a graduated series of tones may exist, all of the same value, but varying in intensity of yellow. At $\frac{1}{2}$ we may suppose a tone half yellow and half high light gray, at $\frac{1}{4}$ a tone only one

* Absolute accuracy would have required an equal spacing of the points W, Y, 2, 4, 1, 5, 3, 6, Black, upon the meridian, with the dotted lines through HL_t, Lt, LL_t, etc., curved to meet them; but that would have complicated the diagrams needlessly.

quarter yellow, and at $\frac{1}{4}$ a tone three quarters yellow. A similar scale of intensities may be fixed for each hue, and for each value of each hue, as for example from 1 to M, from 2 to Lt, 4 to LLt, etc. Such grayed tones are sometimes called broken colors. The following terms now become intelligible:

SCALE OF VALUES (of color): a consistent series of tones of one hue from white to black; a vertical scale.

SCALE OF INTENSITIES: a consistent series of tones of one value from full color to neutrality; a horizontal scale.

SCALE OF HUES: a consistent series of tones from one color to another; a horizontal or a diagonal scale.

COMPLEMENTARY TONES: tones diametrically opposite one another in the color sphere; tones from opposite scales which balance one another as Y and V, white and black, etc.

ANALOGOUS TONES: tones adjacent in the color sphere; neighboring tones, as Y, Y-G, G; HLt, Lt, etc.

CONTRASTING TONES: tones not adjacent in the color sphere; tones neither complementary nor analogous, as Y and B, Y and VR, etc.

WARM COLORS: Tones in the color sphere whose hue is influenced by orange.

COOL COLORS: Tones in the color sphere whose hue is influenced by blue. Orange or flame color is the warmest color and blue, its opposite, is the coolest color. The terms are relative, and are used rather loosely.

BALANCE: The adjustment of tones with reference to each other. There are three varieties.

I Balance of value: An adjustment of two values with reference to a third whether present or absent. On the color plate, for example, the four circles at the right show balance of value with reference to middle tone; the upper one is LLt and HD, the next Lt and D, the next HLt and LD, and the last White and Black in the orange scale $\frac{1}{2}$ intensity. The middle tone is not present.

II Balance of Hue: an adjustment of two hues with reference to a third present as the dominant tone. On the color plate, for example, the lower border illustrates balance of hue; blue and green are bal-

anced over blue-green, present in the background as the dominant tone.

III Balance of Intensity: an adjustment of two tones with reference to a neutral. For example, O $\frac{1}{2}$ with B $\frac{1}{2}$ would form a balance of intensity over M. In tone balances, the proportions need not be half and half, seldom are half and half, except in a checkerboard of white and black, or of red and green. O $\frac{1}{2}$ will balance B $\frac{1}{2}$ if the area of each is inversely the same. All the finer balances are matters of feeling. Rules do not help.

All groups of tones used in coloring a design, picture, or object, may be classified for convenience into

HARMONIES OF COLOR, of which there are five typical kinds:

I Neutral Harmony: a group of tones from the neutral scale, or scale of grays. The designs in the margin of the Outline are in neutral harmony.

II Monochromatic Harmony: a group of tones from one color scale; different values of one color, or different intensities of one color. The circular designs on the color plate are monochromatic harmonies.

III Analogous Harmony: a group of analogous tones, where one is dominant. The border on the color plate is an analogous harmony.

IV Complementary Harmony: a group of tones from complementary scales. The cross-stitch borders in the December number are in complementary harmony.

V Complex Harmony: a group of tones from two opposite analogous groups. An analogous harmony plus the complementary of its dominant tone, or plus another analogous group opposite the first in the color sphere. The color plate, Studio for March, p. 27, is a good illustration of complex harmony.

The problem of the teacher is to build up in the mind of the pupil the image of a useful color instrument, upon which harmonies may be played, and by which the works of the masters of tone may be interpreted.

MRS. KETTELLE, in the first article this month, tells how to make a beginning. The Outline for the month gives one order of going, the best we know up to date. The color plate made by the Colorgraph Company of Boston, shows the best color reproduction available for magazine work at the present time.

FOR practice in coloring the best outlines published, so far, are those by the Prang Educational Company, Prang's Outline Pictures, with directions for coloring, fourteen sets, each containing ten plates, price 25 cts. per set. For the most elementary work a set of 28 Water Color Outlines is published at 25 cts. per hundred. Price list giving details, upon application.

THE life drawing outlined last month should be continued this month, furnishing applications of color harmonies, conventional forms of birds, butterflies, animals, and the figure are fascinating elements in design. Speaking of conventional birds reminds me of one recently brought home from the Philippines. It is the property of Mr. Arthur W. Cleaves of North Scituate, and is made of a single piece of wood whittled and split into this decorative shape, and perched upon a bush made from another single piece. It was impossible to discover a point of view

for the photograph which would reveal all the beauties of this wooden bird of paradise. Perhaps the Philippinos can beat a Yankee — at whittling!



MISS ESTELLE REEL'S report to the Commissioner of Indian Affairs, an illustrated pamphlet of 46 pages, which may be had for the asking (through your representative at Washington), shows that skill in handicraft is to be found among the original Americans as well as among the latest.

OTHER reports out recently and worth having, are those of the Pacific Manual Training Teachers' Association, containing among other good

things, Mr. Batchelder's paper on Design in its relation to constructive work; and of the Western Drawing Teacher's Association, full of suggestive discussions. The first may be had of Arthur H. Chamberlain, Pasadena, California, and the second of Mary E. Chamberlain, Saginaw, Michigan.

ANY Supervisor who is likely to have an Arts and Crafts show on his hands in the near future could not make a better investment of 20 cts. than to send it to Miss E. H. Perry, State Normal School, Bridgewater, for a copy of the Handbook, recently prepared under her direction for an Exhibition of wall hangings, rugs, textiles, embroidery, lace, basketry, ceramics, glass, leather, printing, binding, illustration, bead and metal work, carving, etc., held in Bridgewater in February. He will find out who exhibits such things, and learn something about each line of handicraft.

ELSON'S Catalogs are also worth owning. His *Rise and Progress of Greek and Roman Art* (15 cts.) contains 40 prints with an introduction by Prof. T. W. Heermance of Yale, and descriptions of sculptures by Prof. Tarbell of the University of Chicago. His *Renaissance Painting in Italy* (35 cts.) contains 59 prints with descriptions by Dr. John C. Van Dyke. His large carbon prints of Greek sculpture are "better than the originals for school use," and

his beautiful mellow toned photogravures of the Italian masterpieces (10 cts. each) are a joy to the eye, and to the hand. Address A. W. Elson, 146 Oliver St., Boston, Mass.

SCHOOL magazines have a certain charm in common with all good things "in the making." The Normal Advance of Oshkosh, Wisconsin, is no exception. In fact it is more than ordinarily attractive because it contains more pupils' work than many another—ornamental initials, designs, illustrations, as well as literary contributions—by pupils of all ages. The Christmas number was excellently well done.

FITCHBURG, Massachusetts, has the honor of publishing the first School magazine after the manner of The Printing Art, only one degree finer, because the pages of illustration are not reproductions, but the originals themselves. The Monotype, "Published four times a year by the Art Department of the Fitchburg High School in the interest of Art Education and Home Industries," is more truly a School magazine than almost any other, for the type is set, the printing done and the magazine bound by the pupils themselves. The Christmas number, limited to sixteen copies, contains within its illuminated covers a pretty monotype, an illuminated prayer, half tones of manual arts work, ten

pages of original drawings in black and white and in color all done by students, and thirty six pages of entertaining and instructive reading matter besides. It is a handsome volume, 9x12. The next edition will be of seventy-five copies. Mr. Randell, the enterprising Director of Manual Arts for the city, is to write for us in the near future.

PLANS are being perfected for the annual meeting of the Eastern Art Teachers' Association at Springfield, Mass., May 5-7, and of the Western Drawing Teachers' Association at Milwaukee, Wisconsin, May 10-13. Plan to attend the nearer one at least. It will do you good.

A SIGNIFICANT sign of the times comes from Helena, Montana, a course entitled, "The Girl in the Home." It includes such topics as What a girl needs to know: 1, in relation to herself; 2, in relation to the family; 3, in relation to her friends; 4, in relation to home decorations; 5, in relation to occupations; 6, in relation to homes in other lands; 7, in relation to a true life. Mr. Randal J. Condon, the author of this sensible document was formerly superintendent of schools in Everett, Mass.

WE must double our subscription list AGAIN before the end of this school year. That is the only way to secure a richer number of the magazine each month. Everybody can help.